

WHAT IS CLAIMED IS:

- 1 1. A method for compiling source code for a plurality of
2 heterogeneous processor types, said method comprising:
3 receiving source code;
4 selecting a processor type from the plurality of
5 heterogeneous processor types; and
6 creating an object file that corresponds to the source
7 code, wherein the object file is adapted to be
8 processed by the selected processor type.
- 1 2. The method as described in claim 1 wherein the source
2 code includes a plurality of source code subtasks and
3 wherein the selecting is performed for each of the
4 plurality of source code subtasks.
- 1 3. The method as described in claim 2 wherein the
2 selecting is performed during compilation, the method
3 further comprising:
4 retrieving one of the source code subtasks from the
5 plurality of source code subtasks;
6 determining whether the source code subtask includes a
7 program directive corresponding to one of the
8 plurality of processors; and
9 performing the selecting in response to the
10 determination.
- 1 4. The method as described in claim 2 further comprising:
2 retrieving one of the source code subtasks from the
3 plurality of source code subtasks; and

4 compiling the retrieved source code subtask, the
5 compiling resulting in byte code.

1 5. The method as described in claim 4 further comprising:
2 sending the byte code to a client over a computer
3 network, wherein the byte code is adapted to be
4 translated into client-specific object code by the
5 client whereby the client-specific object code is
6 formatted based upon a processor type that is located
7 at the client.

1 6. The method as described in claim 2 further comprising:
2 retrieving one of the source code subtasks from the
3 plurality of source code subtasks;
4 identifying one or more operations included in the
5 retrieved source code subtask;
6 matching one or more of the operations with one of the
7 processor types from the plurality of heterogeneous
8 processor types; and
9 performing the selecting in response to the matching.

1 7. The method as described in claim 1 further comprising:
2 receiving a processor-specific command, the processor
3 specific command identifying a processor type from the
4 plurality of heterogeneous processor types; and
5 performing the selecting based upon the processor-
6 specific command.

1 8. An information handling system comprising:
2 a plurality of heterogeneous processors;

3 a memory accessible by the heterogeneous processors;
4 one or more nonvolatile storage devices accessible by
5 the heterogeneous processors; and
6 a source code compilation tool for compiling source
7 code, the source code compilation tool comprising
8 software code effective to:
9 receive source code from one of the
10 nonvolatile storage devices;
11 select a processor type from a plurality of
12 heterogeneous processor types, each of the
13 plurality of heterogeneous processor types
14 correspond to each of the plurality of
15 heterogeneous processors; and
16 create an object file that corresponds to
17 the source code, wherein the object file is
18 adapted to be processed by the selected
19 processor type.

1 9. The information handling system as described in claim
2 8 wherein the source code includes a plurality of
3 source code subtasks and wherein the processor type
4 selection is performed for each of the plurality of
5 source code subtasks.

1 10. The information handling system as described in claim
2 9 wherein the processor type selection is performed
3 during compilation, wherein the software code is
4 further effective to:

5 retrieve one of the source code subtasks from the
6 plurality of source code subtasks located in one of
7 the nonvolatile storage devices;
8 determine whether the source code subtask includes a
9 program directive corresponding to one of the
10 plurality of processors; and
11 performing the selecting in response to the
12 determination.

1 11. The information handling system as described in claim
2 9 wherein the software code is further effective to:
3 retrieve one of the source code subtasks from the
4 plurality of source code subtasks; and
5 compile the retrieved source code subtask, the
6 compiling resulting in byte code.

1 12. The information handling system as described in claim
2 11 wherein the software code is further effective to:
3 send the byte code to a client over a computer
4 network, wherein the byte code is adapted to be
5 translated into client-specific object code by the
6 client whereby the client-specific object code is
7 formatted based upon a processor type that is located
8 at the client.

1 13. The information handling system as described in claim
2 9 wherein the software code is further effective to:
3 retrieve one of the source code subtasks from the
4 plurality of source code subtasks located in one of
5 the nonvolatile storage devices;

- 6 identify one or more operations included in the
7 retrieved source code subtask;
- 8 match one or more of the operations with one of the
9 processor types from the plurality of heterogeneous
10 processor types; and
- 11 perform the selecting in response to the matching.
- 1 14. A computer program product stored on a computer
2 operable media for compiling source code for a
3 plurality of heterogeneous processor types, said
4 computer program product comprising:
5 means for receiving source code;
- 6 means for selecting a processor type from the
7 plurality of heterogeneous processor types; and
- 8 means for creating an object file that corresponds to
9 the source code, wherein the object file is adapted to
10 be processed by the selected processor type.
- 1 15. The computer program product as described in claim 14
2 wherein the source code includes a plurality of source
3 code subtasks and wherein the selecting is performed
4 for each of the plurality of source code subtasks.
- 1 16. The computer program product as described in claim 15
2 wherein the means for selecting is performed during
3 compilation, the computer program product further
4 comprising:
5 means for retrieving one of the source code subtasks
6 from the plurality of source code subtasks;

7 means for determining whether the source code subtask
8 includes a program directive corresponding to one of
9 the plurality of processors; and

10 means for performing the selecting in response to the
11 determination.

1 17. The computer program product as described in claim 15
2 further comprising:

3 means for retrieving one of the source code subtasks
4 from the plurality of source code subtasks; and

5 means for compiling the retrieved source code subtask,
6 the compiling resulting in byte code.

1 18. The computer program product as described in claim 17
2 further comprising:

3 means for sending the byte code to a client over a
4 computer network, wherein the byte code is adapted to
5 be translated into client-specific object code by the
6 client whereby the client-specific object code is
7 formatted based upon a processor type that is located
8 at the client.

1 19. The computer program product as described in claim 15
2 further comprising:

3 means for retrieving one of the source code subtasks
4 from the plurality of source code subtasks;

5 means for identifying one or more operations included
6 in the retrieved source code subtask;

7 means for matching one or more of the operations with
8 one of the processor types from the plurality of
9 heterogeneous processor types; and
10 means for performing the selecting in response to the
11 matching.

1 20. The computer program product as described in claim 14
2 further comprising:
3 means for receiving a processor-specific command, the
4 processor specific command identifying a processor
5 type from the plurality of heterogeneous processor
6 types; and
7 means for performing the selecting based upon the
8 processor-specific command.